Exhibit 1

UNITED STATES DISTRICT COURT
SOUTHERN DISTRICT OF NEW YORK

IN RE BANK OF AMERICA CORP. SECURITIES, DERIVATIVE, AND EMPLOYEE RETIREMENT INCOME SECURITY ACT (ERISA) LITIGATION	)	Master File No. 09 MDL 2058 (PKC)
This Document Relates To: The Consolidated Securities Action	)	

REBUTTAL REPORT OF CHAD COFFMAN, CFA

I. INTRODUCTION

1. My name is Chad Coffman. I am the President of Global Economics Group, a Chicago-based firm that specializes in the application of economics, finance, statistics, and valuation principles to questions that arise in a variety of contexts, including, as here, in the context of litigation.

2. I have previously submitted an expert report in this matter ("Coffman Report" or my "Report") in which I opined that Bank of America ("BoA", or the "Company") Common Stock traded in an efficient market throughout the Class Period.[1] Subsequent to the submission of my Report, Lead Counsel for Plaintiffs provided me with the expert report of Dr. Allen Ferrell ("Ferrell Report"). I have been asked to review and respond to the opinions expressed in the Ferrell Report.

3. The additional materials I have relied upon in forming the opinions expressed in this Rebuttal Report are summarized in **Appendix A**. Global Economics Group is being compensated at an hourly rate of $525 per hour for my work on this matter and my compensation is in no way contingent on the outcome of this case or the opinions I express. My qualifications and curriculum vitae were included in my previous Report, but I briefly review them here.

II. QUALIFICATIONS

4. I hold a Bachelor's Degree in Economics with Honors from Knox College and a Master's of Public Policy from the University of Chicago. I am also a CFA charter-holder. The CFA, or Chartered Financial Analyst, designation is awarded to those who have sufficient practical experience and complete a rigorous series of three exams over three years that cover a wide variety of financial topics including financial statement analysis and valuation.

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[1] The putative Class Period is from September 18, 2008 through and including January 21, 2009 (Consolidated Second Amended Class Action Complaint ("Complaint") at ¶ 1).

5. I, along with several others, founded Global Economics Group in March 2008.[2] Prior to starting Global Economics Group, I was employed by Chicago Partners for over twelve years where I was responsible for conducting and managing analysis in a wide variety of areas including securities valuation and damages, labor discrimination and antitrust. I have been engaged numerous times as a valuation expert both within and outside the litigation context. My experience in class action securities cases includes work for plaintiffs, defendants, D&O insurers and a prominent mediator (Retired Judge Daniel Weinstein) to provide economic analysis and opinions in dozens of securities class actions as well as other matters. As a result of my involvement in these cases, much of my career has been spent analyzing and making inferences about how quickly and reliably, and to what degree, new information impacts securities prices.

6. My qualifications are further detailed in my updated curriculum vitae, which is attached as **Appendix B**.

III. SUMMARY OF OPINIONS

7. The Ferrell Report does not dispute the market efficiency of BoA Common Stock, and the opinions offered in my previous Report remain uncontested. In fact, Dr. Ferrell assumes that BoA Common Stock traded in an efficient market.[3]

8. Dr. Ferrell asks the Court to conclude that the information regarding Merrill's fourth quarter losses and bonuses was not material and supposedly had no impact on the price of BoA Common Stock when it was disclosed to the market. In short, Dr. Ferrell is engaging in a loss causation analysis. While I understand loss causation is not an appropriate inquiry at this stage, the evidence shows his opinion is unreliable. Specifically, with respect to Merrill's losses:

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[2] Global Economics Group was formerly known as Winnemac Consulting, LLC.

[3] *See*, for example, Ferrell Report, pp. 14, 15 and 18.

i. According to my event study, BoA Common Stock had a statistically significant negative abnormal return on both January 15 and January 16, 2009 – days on which new information regarding Merrill's Q4 2008 losses became available to the market.

ii. Analysts, the financial media, and rating agencies all reacted with astonishment at the size of Merrill's Q4 2008 losses.

iii. In addition, the Company's own actions and statements showed the losses were material and not expected by the market. In particular, the Company took the extraordinary step of telling the United States Government that Merrill's losses were so large that they could not absorb Merrill without government assistance and would have to invoke the material adverse change clause to abandon the deal without such assistance.

iv. Further, BoA and Merrill acknowledged in their Forms 10-K for 2008 that Merrill's fourth quarter losses were "larger than expected" and directly led to the bailout. Moreover, numerous facts alleged in the Complaint – including emails by former BoA Treasurer Jeffrey Brown and others stating that the rating agencies "do not have an inkling" of Merrill's losses – make clear that BoA knew that Merrill's losses were material and unexpected by the market.

v. The Ferrell Report itself (on Exhibit 5) clearly indicates that BoA's Common Stock price, even after controlling for his industry index, fell 11% on January 15, 2009 and describes this decline as statistically significant at the 95% confidence level. Moreover, his model shows BoA's Common Stock price fell an additional 8% on January 16, 2009, which, according to his event study, is

statistically significant at the 90% level. Even before correcting his event study model for a fundamental bias against finding statistical significance during the Class Period, his own analysis supports that there was a material market reaction (of over $19 billion) on these two days in which the market learned additional information about the magnitude of Merrill's Q4 2008 losses.

vi. The Ferrell Report asserts that news regarding the government bailout and dividend cut is "confounding" information. I understand that Plaintiffs contend that the government bailout and dividend cut are a direct result of the losses, and thus any price reaction related to the bailout and the dividend cut would be within the scope of what Plaintiffs claim as recoverable damages. Indeed, Ferrell's assertion contradicts the Company's own statements, including the statements set forth in BoA's and Merrill's Forms 10-K that BoA received the bailout "due to larger than expected fourth quarter losses of Merrill Lynch."[4] Similarly, the dividend cut was in fact *required* by the U.S. government as part of its terms for BoA to receive government aid – which was itself a direct result of the previously undisclosed losses at Merrill.[5]

vii. The Ferrell Report seeks to rely on a December 7, 2008 Morgan Stanley Report as the primary evidence that the market was somehow aware of the magnitude of Merrill's Q4 2008 losses. This contention is without merit. First, there is no evidence that other analysts or the financial press viewed the report as

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[4] Bank of America Forms 10-K for fiscal year 2008 and Merrill Lynch Forms 10-K for fiscal year 2008.

[5] *See* TARP "Term Sheet" from "Treasury, Federal Reserve, and the FDIC Provide Assistance to Bank of America," *Federal Reserve Board*, January 16, 2009, URL <http://www.federalreserve.gov/newsevents/press/bcreg/bcreg20090115a1.pdf>; or "Bank of America to Receive $20 Billion More," *The New York Times*, January 16, 2009; "BAC: BAC misses 4Q; Forced to Cut Divvy to 1¢; Runs TCE to 2.6%," *Keefe, Bruyette & Woods*, January 20, 2009.

accurate or reliable. Second, the report was issued after the shareholder vote and did not provide anyone voting on the transaction with relevant information. Finally, there is no evidence that this analyst knew or suggested that the market knew that Merrill's losses for the fourth quarter were so devastating that BoA was seeking to terminate the merger or needed a Government bailout to close the deal. Rather, as set forth herein, the reactions of the financial media, financial analysts, the rating agencies and investors establish that the market was not anticipating that Merrill was going to report such massive losses.

9. The Ferrell Report's conclusions as to the materiality of information concerning Merrill's bonuses are also without merit. Dr. Ferrell again engages in a loss causation analysis by asking the Court to conclude that information about Merrill's bonuses was not material and had no impact on the price of BoA Common Stock. While I understand loss causation is not an appropriate inquiry at this stage, the evidence again shows that Dr. Ferrell is not correct.

i. According to my event study, there was a statistically significant price decline on January 22, 2009.

ii. Dr. Ferrell cannot reasonably argue that there was no new Merrill information regarding bonuses released that day – that is belied by the disclosure itself and the substantial market commentary that followed.

iii. The Ferrell report contends that the resignation of John Thain is "confounding" information. I understand that Plaintiffs contend that the resignation is a direct result of the losses and the bonus agreement, and thus any price reaction supposedly caused by Thain's departure would be within the scope

of what Plaintiffs claim as recoverable damages. Again, however, this is a loss causation question.

iv. Finally, even if the resignation of John Thain were determined to be confounding information, the vast majority of the decline BoA's stock price on January 22, 2009 occurred prior to what the Ferrell Report cites as the first reporting of Thain's departure, demonstrating that Ferrell is incorrect in contending that news of Thain's departure provides an alternate explanation for the price decline on that day.

10. Separate and apart from the other criticisms of his opinions, Dr. Ferrell's event study analysis is fundamentally flawed and understates the statistical significance of the market price reactions to the disclosures of Merrill's losses and bonus information. Notably, as explained further below, when citing the literature that supposedly supports his analysis, Dr. Ferrell omits the key sentence that directly contradicts his methodology and supports mine. The sentence that he omitted specifically states that the "most common" way to analyze the statistical significance of market price reactions is the method I have employed in my analysis. Further:

i. Dr. Ferrell's finding that the price decline on January 16, 2009 is significant at the 90% confidence level (instead of well beyond the 99% level) is entirely dependent on the inappropriate incorporation of the massive increase in volatility in BoA Common Stock after the Class Period into his statistical test procedure.

ii. Even under Dr. Ferrell's regression methodology, if one uses the proper Class Period volatility to perform the statistical test, both January 15 and January

16 are statistically significant at greater than the 99% confidence level. This approach conforms more closely to the standard event study procedure, and the results are much more consistent with the qualitative nature of the news released on those days.

iii. Dr. Ferrell's claim that my selection of a peer index is inappropriate is neither accurate nor material to any of my opinions regarding materiality or market efficiency.

11. The remainder of this report is organized as follows: **Section IV** of this report briefly comments on market efficiency. **Section V** reviews Dr. Ferrell's discussion regarding the materiality of Merrill's Q4 2008 losses. **Section VI** reviews Dr. Ferrell's opinion regarding the materiality of the Merrill bonuses. **Section VII** examines Dr. Ferrell's event study methodology.

12. I understand that discovery in this case is ongoing and has not yet been completed. Therefore, I reserve the right to amend this report to reflect new information available to me in light of the ongoing discovery process and/or future rulings from the Court.

IV. FERRELL REPORT – MARKET EFFICIENCY

13. Dr. Ferrell does not dispute my opinion that BoA Common Stock traded in an efficient market. Thus, there is no economically substantive dispute that BoA Common Stock traded in an efficient market during the Class Period.

14. For the market efficiency analysis contained in my Report, I analyzed the five factors identified as relevant to the determination of whether an efficient market exists for a given security by the *Cammer v. Bloom* court: 1) average weekly trading volume, 2) analyst coverage, 3) market makers, 4) SEC Form S-3 eligibility, and 5) price reaction to unexpected information. I also analyzed four additional factors relevant to assessing market efficiency: 1)

market capitalization, 2) bid-ask spread, 3) institutional ownership, and 4) autocorrelation. As part of my analysis of price reaction to unexpected information, I performed an "event study" under accepted methodological principles. As explained in more detail in my Report, an event study examines the daily fluctuations in securities prices and allows one to infer whether company-specific news caused the change in price net of market and industry forces.

15. Applying an empirical analysis of these factors during the Class Period to the Common Stock, I opined that this security traded in an efficient market. The Common Stock had substantial trading volume to suggest an efficient market and compared favorably to stocks traded on the NYSE and NASDAQ during the Class Period. I found a clear cause and effect relationship between new information and price changes, significant analyst coverage, and an active market for information regarding the Company.

16. In response, Dr. Ferrell does not even attempt to examine any of the *Cammer* factors that are relevant to the market efficiency analysis. Dr. Ferrell also does not seriously criticize either my methods or my conclusions that the secondary market was efficient during the Class Period. The only criticism in the Ferrell Report that even indirectly touches upon my market efficiency conclusion is his criticism that my industry index is over-inclusive of companies that are not sufficiently similar to BoA. I disagree that my industry index is inappropriate and note that the returns of his proposed index and the index I rely upon are very highly correlated – with my index able to explain 96% of the movement in his index. Furthermore, all of the empirical analysis I rely upon to support my efficiency opinion are robust to the use of his alternative index.

V. MATERIALITY OF Q4 2008 MERRILL LOSSES

17. On January 15, 2009, *The Wall Street Journal* reported that BoA was to receive TARP funds to help cover the Merrill acquisition, **citing larger than expected losses at Merrill** (not quantified). The article stated "[t]he U.S. government is close to finalizing a deal that would give billions in additional aid to BoA to help it close its acquisition of Merrill Lynch & Co."[6] BoA announced that it was moving its fourth quarter and full year earnings release up four days to the next day, January 16, 2009.

18. Then, on January 16, 2009, before the market opened, BoA announced its Q4 2008 earnings, including those for the recently acquired Merrill Lynch.[7] BoA announced that Merrill Lynch had a pre-tax loss of $21 billion for Q4 and an after-tax loss of more than $15 billion. These losses were much higher than even the Company had expected. For example, on the conference call following the earnings announcement, BoA CEO Ken Lewis stated,

> "Yes, in a nutshell, much, much higher deterioration of the [Merrill Lynch] assets we had identified than we had expected, going into the fourth quarter. So our forecast of losses, Merrill Lynch's forecast of losses and, frankly, I would think most anybody in the capital markets business would have forecasted a lower loss rate than what we saw, so it wasn't an issue of not identifying the assets." [8]

[6] "Bank of America to Get Billions in U.S. Aid --- Sides Finalizing Terms for Fresh Bailout Cash; Lender Told Treasury That Without Funds, It Couldn't Close Deal for Ailing Merrill," *The Wall Street Journal*, January 15, 2009.

[7] "Bank of America Earns $4 Billion in 2008; Fourth-Quarter Net Loss of $1.79 Billion; Extends $115 Billion in New Credit in Fourth Quarter; $15.31 Billion Fourth-Quarter Net Loss at Merrill Lynch; U.S. Invests $20 Billion in Bank of America; Also Provides Insurance for $118 Billion in Exposure; Quarterly Dividend Reduced to $.01," *PR Newswires*, 16 January 16, 2009, 06:00.

[8] *See*, for example, "Event Brief of Q4 2008 Bank of America Corporation Earnings Conference Call – Final," *Voxant FD WIRE*, January 16, 2009.

19. Merrill's losses led to the Company's need for a $20 billion investment from the U.S. Government, which required the Company to slash its Common Stock dividend from $0.32 per share to $0.01 per share.[9]

20. According to the event study described in my prior Report, BoA Common Stock had a highly statistically significant negative abnormal return on both January 15 and January 16, 2009. **Exhibit 1**, attached hereto, shows the results of my event study regression, the calculation of the abnormal returns associated with these events, and the statistical test showing the level of statistical significance. On January 15, 2009, BoA's stock experienced an abnormal return of -12.63% after controlling for a broad market and industry index. This is statistically significant at well beyond the 95% level (99.9813% to be precise).[10] On January 16, 2009, there was an abnormal return of -11.23%, which is also statistically significant at the 95% level (99.9203%).

21. In response to these conclusions, Dr. Ferrell engages in a loss causation analysis by asking the Court to conclude that the information concerning Merrill's losses was not material and had no impact on the price of BoA shares. While I understand loss causation is not an appropriate inquiry at this stage, the evidence nevertheless shows his opinion is unreliable for several reasons.

22. To start, the Ferrell Report's contention that his event study supports a finding that Merrill's losses were immaterial is perplexing. Even according to his own event study, Exhibit 5 of the Ferrell Report clearly indicates that, after controlling for an industry index, he

[9] *See* TARP "Term Sheet" from "Treasury, Federal Reserve, and the FDIC Provide Assistance to Bank of America," *Federal Reserve Board*, January 16, 2009, URL<http://www.federalreserve.gov/newsevents/press/bcreg/bcreg20090115a1.pdf>; or "Bank of America to Receive $20 Billion More," *The New York Times*, January 16, 2009; "BAC: BAC misses 4Q; Forced to Cut Divvy to 1¢; Runs TCE to 2.6%," *Keefe, Bruyette & Woods*, January 20, 2009.

[10] In Section VII, I discuss in detail why there is such a divergence in the degree of statistical significance between my event study and the event study in the Ferrell Report and how his methodology is fundamentally flawed.

calculates that BoA Common Stock fell 11% on January 15, 2009 and that this price reaction was significant at the 95% level. He further calculates that on January 16, 2009 the price fell over 8% after controlling for an industry index, and his t-statistic indicates it is significant at the 90% level. A test of joint significance (using his data) for the two days is significant at the 99% level. Thus, the Ferrell Report's quantitative analysis, contrary to the way it is described in his text, indicates that the new news on these days was material.

23. Further, a host of qualitative data – namely, the reaction of analysts, rating agencies, and the financial press – further confirm that Merrill's losses were material and unexpected. When Merrill's Q4 2008 losses became known to the market, they were referred to as "much worse than expected", "shocking", "devastating" and "horrifying". Analysts were shocked because Merrill not only failed to meet expectations, which were largely projected as positive in reports issued during Q4 2008, but also experienced excessive losses, even when compared with recent, large quarterly losses.[11] After the market closed, both Fitch and Moody's immediately downgraded BoA.[12] Later in review, *The Wall Street Journal* reported, "internal calculations showed Merrill had a **horrifying** pretax loss of $13.3 billion for the previous two months, and December was looking even worse."[13] Additional analyst and news commentary included:

> "(2) **Merrill was much, much worse than expected –** Merrill lost $15bn, 3X worse than last quarter. To put $15 bn after-tax in perspective, 60% of the common equity base of the company was lost in one quarter. (3) As a result, BoA's pro forma capital position became very thin (2.6%

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[11] "COMMENT: Bank of American Corporation (BAC) $8.32. First Take: Self-inflected wounds," *Goldman Sachs*, January 16, 2009.

[12] "Fitch Downgrades Bank of America N.A. IDR to 'A+'; Affirms BofA Corp. at 'A+'," *Fitch Ratings*, January 16, 2009, 16:39; "Moody's lowers Bank of America, Merrill Lynch (snr to A1 from Aa3)," *Moody's Investors Service,* January 16, 2009.

[13] Complaint at ¶ 93. (emphasis added)

tangible common post Merrill). (4) This necessitated another round of government money."[14]

"The Merrill Lynch 4Q08 loss looks **much worse than expected** and was likely the motivating factor behind the U.S. Government's providing additional support to BAC. We were expecting a MER 4Q08 loss in the $3 billion area, but it actually came in as a $15.3 billion loss."[15]

"Unfortunately, the decent core earnings from BAC was more than offset by the **shocking loss at Merrill Lynch**, which lost over $15 billion in the fourth quarter, which appeared to be caused by significant trading and mark to market losses. **This loss was significantly and materially higher than anyone's expectations**, and is largely funded by the US government's $20 billion TARP injection."[16]

"**Bank of America and Merrill Lynch's 4Q08 losses were much greater than the market or the company anticipated**, which prompted Bank of America to ask the U.S. government for assistance to close its acquisition of Merrill Lynch."[17]

"Merrill Lynch reported **a devastating $15.3 billion loss in the fourth quarter**, its last quarter before the merger closed.… 'The question is, When did Merrill Lynch know they had these losses? A lot of times companies would disclose losses of that magnitude,' said Michael Mayo, an analyst at Deutsche Bank. '**This was dramatic**.'"[18]

"**The real source of disappointment was a much larger than anticipated loss at Merrill**. Merrill Lynch results were very disappointing—While we were anticipating weak results out of Merrill, the actual results led by huge marks and very weak core FICC trends were very disappointing."[19]

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[14] "COMMENT: Bank of American Corporation (BAC) $8.32. First Take: Self-inflected wounds," *Goldman Sachs*, January 16, 2009. (emphasis added)

[15] "Company Note: Bank of America Corporation," *Sandler O'Neill and Partners*, January 16, 2009. (emphasis added)

[16] "Bank of America (BAC). Q4 Follow Up; Thundering Herd Takes Its Toll, Downgrading, Cutting Estimates," *Baird*, January 20, 2009. (emphasis added)

[17] "Financial Institutions: Super-Regional & Regional Banks. Bank of America Corporation (BAC - $7.18*)," *Friedman, Billings, Ramsey & Co., Inc.*, January 20, 2009.

[18] "For Bank of America, the Pressure Mounts over Merrill Deal," *The New York Times*, January 17, 2009. (emphasis added)

[19] "4Q08 Results Reveal Significant Deterioration at MER," *Citigroup*, January 22, 2009. (emphasis added)

24. As noted above, credit ratings agencies Fitch and Moody's both downgraded BoA as a result of the losses at Merrill Lynch. Moody's wrote that its "rating action follows the disclosure of substantial losses at Merrill Lynch for the fourth quarter of 2008…."[20] Similarly, Fitch stated that "[l]egacy MER reported massive losses in excess of $15 billion....The downgrade of Merrill Lynch & Co's Individual Rating to 'F' reflects Fitch's view that this entity would likely not have survived absent assistance provided by the U.S. Treasury."[21]

25. Moreover, BoA's own actions and statements indicate the losses at Merrill were material. Indeed, the Company found the losses material enough to provide grounds for invoking the material adverse change ("MAC") clause to abort the merger. In fact, the Company went to the government for assistance and wanted to invoke the material adverse change clause to cancel the merger, and subsequently requested and received a bailout instead. As CEO Ken Lewis stated, Merrill's losses were so large that "[w]e went to our regulators and told them that we would not – that we could not close the deal without their assistance. As a result, we have agreed to the issuance of $20 billion in Tier 1 qualifying TARP preferred as well as the issuance of an additional preferred of $4 billion in exchange for an asset guarantee that is essentially insurance protection on approval of capital markets related assets."[22] No analyst or market commentator had previously predicted that Merrill's Q4 2008 losses would be so material that BoA would seek to invoke the MAC and need a Government bailout to survive. Indeed, BoA's own Form 10-K for 2008, filed February 27, 2009, stated that "**due to larger than expected 2008 fourth quarter losses of Merrill Lynch** and as part of its commitment to support the

[20] "Moody's lowers Bank of America, Merrill Lynch (snr to A1 from Aa3)," *Moody's Investors Service,* January 16, 2009.

[21] "Fitch Downgrades Bank of America N.A. IDR to 'A+'; Affirms BofA Corp. at 'A+', *Fitch Ratings,* January 16, 2009, 16:39.

[22] "Preliminary Transcript, BAC – Q4 2008 Bank of America Corporation Earnings Conference Call," *Thomson StreetEvents*, January 16, 2009, 07:00, p. 4 (Ken Lewis speaking).

financial markets stability, the U.S. government agreed to assist the Corporation in the Merrill Lynch acquisition by agreeing to provide certain guarantees and capital."[23] Further, CEO Lewis specifically stated that Merrill's losses were so large that they "shocked" the market, stating that "the magnitude of the loss, obviously, at Merrill Lynch really stunned people. And so it was a bad day, and it did shock a lot of people and disappoint a lot of people."[24]

26. In addition, the Complaint alleges that BoA's senior officers were aware of the staggering losses at Merrill Lynch and knew that the market was unaware of these facts. For example, on December 17, 2008, in an internal email, Jeff Brown, BoA's Treasurer, stated that "[S&P] clearly think[s] ML is more healthy than they are and that they have shed the worst risks."[25] Two days later, in another email from Moody's forwarded to BoA's in-house disclosure counsel, Brown stated, "Moody's comment on the deal – again **another sign agencies don't know what is coming**."[26] Finally, after receiving this email, BoA outside counsel Wachtell and senior partner Peter Hein noted that, "if Target [Merrill] now belatedly makes that disclosure [increasing 4Q losses], likely to have adverse impact on perception of rating agencies (**who do not have an inkling this is coming**); such a rating agency reaction would, if such reaction occurred after the deal fell apart, presumably confirm materiality of the fourth quarter losses."[27]

27. Given all the data summarized above, the Ferrell Report's contention that the magnitude of the Q4 2008 loss at Merrill Lynch was not material is unreliable. While the Ferrell Report states that "[t]he fact that Merrill Lynch faced substantial losses in 4Q 2008 was not news

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[23] Bank of America 2008 10-K.

[24] Interview with Ken Lewis on "Breaking the Bank," *PBS Frontline*, recorded April 9, 2009, aired June 16, 2009.

[25] Complaint at ¶ 167.

[26] Complaint at ¶ 170. (emphasis added)

[27] Complaint at ¶ 171. (emphasis added)

in light of previously publicly available information,"[28] there is an abundance of evidence regarding the materiality of Merrill's losses from multiple sources, including the qualitative reactions of market participants, BoA itself, and the United States Government. Even Dr. Ferrell's own quantitative analysis of BoA's Common Stock price reaction supports a finding of materiality, as noted above.

28. This significant reaction to the disclosure of the "horrifying" $15 billion after-tax losses (and more than $20 billion in pre-tax losses) at Merrill provides evidence that the market did not know the magnitude of Merrill's losses, and refutes the theory offered in the Ferrell Report that the market was already aware of the magnitude of the losses. The primary evidence the Ferrell Report cites as justification for the opinion that the market was somehow already aware of Merrill's losses is a December 7, 2008 Morgan Stanley analyst report that estimated purchase accounting adjustments to Merrill's assets of $11 billion. This evidence is insufficient to support the notion the market already anticipated the magnitude of Merrill's losses.

29. First, there is no evidence that other analysts or the financial press viewed the report as accurate or reliable. Second, this report was released after the shareholder vote on the merger, and thus did not provide any relevant information to the voting parties.

30. Finally, there is no evidence that this analyst knew or suggested that the market knew that Merrill's losses for the fourth quarter would be so devastating that BoA was seeking to terminate the merger or needed a Government bailout to close the deal. As the later reaction of analysts, the financial press, and the rating agencies makes clear, the magnitude of the losses, and their impact on the merger, were unexpected.[29]

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[28] Ferrell Report, p. 9.

[29] My regression analysis also establishes that BoA Common Stock had a statistically significant negative cumulative abnormal return on January 12 and January 13, 2009, and on January 13, 2009 individually, at

31. The Ferrell Report also asserts that news regarding the government bailout and dividend cut are “confounding” information which precludes a finding of materiality. Setting aside that this is a loss causation argument, the evidence shows this is not correct and contradicts the Company’s own statements and other evidence establishing that Merrill’s losses led directly to the bailout. As noted above, BoA’s and Merrill’s Forms 10-K for 2008 specifically stated that the bailout was “due to larger than expected 2008 fourth quarter losses of Merrill Lynch.”[30] Further, CEO Ken Lewis himself stated that “[w]e went to our regulators and told them that we would not – that we could not close the deal without their assistance.”[31] Indeed, the *Wall Street Journal* article cited in the Complaint and by the Ferrell Report states that “[t]he U.S. government is close to finalizing a deal that would give billions in additional aid to Bank of America Corp. **to help it close its acquisition of Merrill Lynch & Co.**, according to people familiar with the situation.”[32] Furthermore, the dividend cut was in fact **required** by the U.S. government as part of its terms for BoA to receive government aid – which was itself a direct result of the previously undisclosed losses at Merrill.[33] Thus, it is clear that these pieces

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the 95% confidence level. I also found that the abnormal return on January 12, 2009 was statistically significant at the 90% confidence level. To the extent that the Ferrell Report asserts that the abnormal returns on those dates are attributable to something other than Merrill-specific news, these assertions raise questions of loss causation only.

[30] Bank of America Form 10-K for fiscal year 2008 and Merrill Lynch Form 10-K for fiscal year 2008.

[31] “Preliminary Transcript, BAC – Q4 2008 Bank of America Corporation Earnings Conference Call,” *Thomson StreetEvents*, January 16, 2009, 07:00, p. 4 (Ken Lewis speaking).

[32] “Bank of America to Get Billions in U.S. Aid --- Sides Finalizing Terms for Fresh Bailout Cash; Lender Told Treasury That Without Funds, It Couldn't Close Deal for Ailing Merrill,” *The Wall Street Journal*, January 15, 2009. (emphasis added)

[33] *See* TARP “Term Sheet” from “Treasury, Federal Reserve, and the FDIC Provide Assistance to Bank of America,” *Federal Reserve Board*, January 16, 2009, URL <http://www.federalreserve.gov/newsevents/press/bcreg/bcreg20090115a1.pdf>; or “Bank of America to Receive $20 Billion More,” *The New York Times*, January 16, 2009. “BAC: BAC misses 4Q; Forced to Cut Divvy to 1¢; Runs TCE to 2.6%,” *Keefe, Bruyette & Woods*, January 20, 2009.

of "confounding" news, according to Dr. Ferrell, are in fact a **direct consequence** of Merrill's losses, and thus not "confounding."

32. In sum, there is overwhelming qualitative and quantitative evidence to contradict the Ferrell Report's assertion that Merrill's Q4 2008 losses were immaterial.

VI. MATERIALITY OF MERRILL BONUSES

33. The Ferrell Report also engages in a loss causation analysis by asking the Court to conclude that information about bonuses was not material and had no impact on the price of BoA Common Stock. While I understand loss causation is not an appropriate inquiry at this stage, the evidence nevertheless shows Dr. Ferrell is not correct.

34. After the market closed on January 21, 2009, news of Merrill's billions of dollars of bonuses being paid even as it was experiencing dramatic fourth quarter losses was reported. The *Financial Times* called accelerating the bonus payouts "unusual", and said that "[t]he timing is notable because the money was paid as Merrill's losses were mounting and Ken Lewis, BofA's chief executive, was seeking additional funds from the government's troubled asset recovery programme to help close the deal."[34]

35. According to the event study in my Report, on the first trading day after this information became available, January 22, 2009, BoA's Common Stock price fell by 7.36% after controlling for market and industry factors. This price decline was statistically significant at the 95% level (t-statistic of -2.29).

[34] "Merrill delivered bonuses before BofA deal," *Financial Times,* January 21, 2009, 23:52.

36. Dr. Ferrell cannot reasonably argue that there was no new Merrill information regarding bonuses released that day – that is belied by the disclosure itself and the substantial market commentary that followed.[35]

37. Any dispute about whether the news on this day is corrective or if there is confounding news pertains to loss causation. Thus, Dr. Ferrell's contention that the information released on that day was not new or corrective is a loss causation question. For example, Dr. Ferrell claims that the news about the bonus payments is confounded by the resignation of John Thain. In fact, Plaintiffs contend that Thain was fired as a direct result of the bonus payout and Merrill's losses. Hence, Thain's departure was not confounding information, but rather falls within the scope of the corrective information.[36] Again, in any event, this is a loss causation question.

38. Even if Thain's firing could be considered unrelated to the bonus payout and Merrill's losses, nearly all of the decline in BoA's Common Stock price on January 22, 2009 occurred prior to the time that the Ferrell Report asserts news of Thain's firing reached the market. While the Ferrell Report and the Coffman Report both appropriately focus on full-day returns in general, to further investigate the Ferrell Report's contention that the resignation of

[35] "Merrill paid bonuses early as BofA deal closed," *Reuters News*, January 21, 2009; "WSJ: NY AG Probing Merrill's 11th-Hour Bonuses – Source," *Dow Jones News Service*, January 22, 2009.

[36] Complaint at ¶ 20. *Also see*, for example, "WSJ: Bank Of Amer Had Lost Confidence In Thain – Source," *Dow Jones News Service*, January 22, 2009, 12:23; *Lou Dobbs Tonight*, January 22, 2009: "Former Merrill Lynch CEO John Thain today resigned from Bank of America amid new outrage over executive bonuses and taxpayer money. New disclosures tonight that Merrill Lynch paid out what could be billions of dollars in bonuses…"; "Former Merrill chief Thain out at Bank of America," *The Associated Press*, January 22, 2009; "Former Merrill Chief Is Out at Bank of America," *Washington Post*, January 23, 2009; "Clash at the top forces former Merrill chief to quit BoA," *The Guardian*, January 23, 2009; "Thain Ousted in Clash at Bank of America," *The Wall Street Journal*, January 23, 2009; "Thain's Exit Turns up Heat at BofA Ex-Merrill CEO Out After Disclosures; CEO Lewis Under Increasing Pressure to Make Acquisition Work," *Charlotte Observer*, January 23, 2009; "Mastermind of Merrill sale to BofA is ousted; John Thain drew the ire of his bosses. Some call him a scapegoat," *Los Angeles Times*, January 23, 2009; or "Ex-Merrill Head Thain Says He'll Repay Office Costs (Update1)," *Bloomberg*, January 26, 2009, 11:15.

John Thain provides an alternative explanation for the price decline on January 22, 2009, I analyzed the degree to which BoA's Common Stock price had fallen prior to 10:30 am on January 22, 2009 - the earliest time identified by the Ferrell Report that the market learned of Thain's departure. From the close on January 21, 2009, to 10:30 am on January 22, 2009, the Common Stock price had fallen from $6.68 to $5.85, or $0.83 per share. From 10:30 am on January 22, 2009, to the close on January 22, 2009, BoA's Common Stock price fell from $5.85 to $5.73, or another $0.12 per share. Thus, BoA's Common Stock price had already experienced 87% ($0.83 out of $0.95) of the price decline for the day by the time the news of Thain's departure entered the market according to the Ferrell Report. Accordingly, the Ferrell Report's claim that Thain's departure provides an alternative explanation for the stock price decline is not supported by the data.

39. Moreover, Dr. Ferrell's own quantitative analysis indicates there was a statistically significant (and thus material) decline in BoA's stock price. Exhibit 5 of the Ferrell report indicates that he calculates an abnormal return for BoA stock on January 22, 2009 of -12% with a t-statistic of -2.49, thus indicating the decline is statistically significant at the 95% level.

40. Dr. Ferrell's opinion that undisclosed information regarding Merrill bonus payments was immaterial is unreliable. Given his own event study results, the quantitative analysis presented in the Coffman Report, and the news and commentary of the day, the evidence demonstrates that news regarding Merrill bonus payments was material new information released to the market.

VII. FERRELL REPORT – EVENT STUDY

41. Dr. Ferrell's event study analysis is fundamentally flawed and understates the statistical significance of the market price reactions on Plaintiffs' alleged corrective disclosure dates.

42. In the two previous sections I demonstrated how, even under Dr. Ferrell's approach, Dr. Ferrell's conclusion is unreliable. In this section, I describe a fundamental flaw in how Dr. Ferrell has performed his event study. This flaw results in a severe understatement of the degree of statistical significance associated with the declines in BoA's stock price on Plaintiffs' alleged corrective disclosure dates.

43. I start by describing the statistical test that both Dr. Ferrell and I perform to test for statistical significance in our respective event studies. We each rely on what is known as a "t-statistic". In this context, the t-statistic essentially measures the number of standard deviations an observed price movement (after controlling for market effects) is from zero. The simple formula for calculating a t-statistic on a given trading day is:

$$\boldsymbol{t-statistic} = \frac{\text{change in price after controlling for market effects } (i.e., \boldsymbol{abnormal\ return})}{\text{standard deviation of errors from regression } (i.e., \boldsymbol{root\ mean\ squared\ error})}$$

44. Although we are not in complete agreement regarding the numerator in our respective t-statistics, the primary source of disagreement about the statistical significance of the alleged corrective disclosures comes from differences in the denominator, the standard deviation of the errors also known as the Root Mean Squared Error ("RMSE"). The RMSE, appropriately calculated, measures the magnitude of imprecision one expects in the ability to predict returns from the regression model on the dates of interest. Think of it as a measure of unexplained

volatility in the stock price.[37] Dr. Ferrell asserts the proper measure for the RMSE on the alleged corrective disclosure dates is 4.7% while I calculate a value of 3.2%.

45. The appropriate way to calculate the RMSE, so long as the data allow, is to calculate the observed volatility using data available leading up to the events of interest.[38] Doing so prevents the events themselves or other exogenous events that occur after the events of interest from influencing the expectations that existed as of the events of interest. This issue is especially important in the matter at hand because the volatility of BoA stock increased substantially in the period following the alleged corrective disclosures. **Exhibit 2** shows, using Dr. Ferrell's regression, how the RMSE changed over time. The line on the chart shows a rolling average of the RMSE from the 30 days prior to each day plotted. The RMSE was fairly steady during the Class Period and then substantially increased after the events of interest and then began to decline again after June 18, 2009. One way to quantitatively measure whether or not the volatilities are similar between two groups is a t-test. I performed a t-test to compare the volatility in the Class Period to the volatility post-Class Period and found that the difference between the volatilities is statistically significant at the 99% level. The results of this test are in **Exhibit 3.** In other words, the regression model was substantially less accurate after the events of interest than before.

[37] The term "volatility" technically refers to the squared value of the RMSE, but here I use it to talk generally about the magnitude of the RMSE.

[38] *See*, for example, A. Craig MacKinlay, "Event Studies in Economics and Finance," *Journal of Economic Literature*, Vol. 35, No. 1, March 1997, pp. 13-39: "For example, in an event study using daily data and the market model, the market model parameters could be estimated over the 120 days prior to the event."; David I. Tabak and Frederick C. Dunbar, "Materiality and Magnitude: Event Studies in the Courtroom," Ch. 19, *Litigation Services Handbook, The Role of the Financial Expert*, Third Edition, 2001, p.5.

46. Dr. Ferrell's methodology assumes the proper measure of volatility as of the events of interest is one that incorporates the post-Class period volatility.[39] This is wrong and violates several basic principles of the event study methodology.

47. In the context of securities litigation, the use of post-Class Period data to estimate the regression model is generally reserved for cases, unlike this one, where there is insufficient data or poorly-suited data prior to the events of interest. This is confirmed by the very article Dr. Ferrell cites in the first sentence of his section titled "The Event Study Model." In that article, MacKinlay states,

> "Given the selection of a normal performance model, the estimation window needs to be defined. **The most common choice, when feasible, is using the period prior to the event window for the estimation window.** For example, in an event study using daily data and the market model, the market model parameters could be estimated over the 120 days prior to the event. Generally the event period itself is not included in the estimation period to prevent the event from influencing the normal performance model parameter estimates."

48. Attempting to justify the inclusion of the post-Class Period window, Dr. Ferrell cites to an article by Tabak and Dunbar and quotes them as saying:

> "There are three general choices for the placement of an estimation window: before the event window, surrounding the event window, and after the event window."**…** "The estimation window is often placed at one of [the latter two] locations rather than before the event window because of a lack of relevant prior trading history (for example, because the event window comes shortly after an IPO or change in regulatory environment)."[40]

49. The Ferrell Report's quotation of the Tabak and Dunbar article specifically and conspicuously omits a critical sentence that falls right in between the two separated quotes. The full passage reads:

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[39] Ferrell Report p. 19.

[40] Ferrell Report, p. 19, fn 19.

> "There are three general choices for the placement of an estimation window: before the event window, surrounding the event window, and after the event window. **The most common choice places the estimation window before the event.** Analysts sometimes place the estimation window after the event window or split the estimation window to cover periods before and after the event window . . . The estimation window is often placed at one of [the latter two] locations rather than before the event window because of a lack of relevant prior trading history (for example, because the event window comes shortly after an IPO or change in regulatory environment).[41]

50. Therefore, the very article Dr. Ferrell cites identifies the pre-event period that I utilize as the standard estimation period. In this case there is no compelling reason to deviate from standard practice. In fact, the very opposite is true. The data suggest that for BoA the period after the Class Period is when there is unusual volatility, not before. Thus, it is perplexing that Dr. Ferrell justifies his methodology by stating,

> "I decided to include the additional 87 days from the post-class period given the highly unusual nature of the markets during the putative class period. September 15, 2008 – only three days before the alleged 10b-5 class period began – was the date that Lehman Brothers filed for bankruptcy. The markets were experiencing unprecedented volatility and disruption in the period immediately following the Lehman Brothers bankruptcy filing. In addition to Lehman Brothers, there were serious problems encountered by a number of other large institutions including AIG, Washington Mutual (which filed for bankruptcy on September 26, 2008), Fannie Mae and Freddie Mac. An indication of the unprecedented nature of the markets during this time is the behavior of The Chicago Board Options Exchange Volatility Index ("VIX"), which measures market volatility and uncertainty based on the 30-day expected volatility of the S&P 500 index."[42]

51. This explanation is not convincing. First, Dr. Ferrell does not present any evidence that these events affected the relationship between BoA and the market index or the ability of the model to effectively predict returns during this period. Indeed, higher volatility in

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[41] David I. Tabak and Frederick C. Dunbar, "Materiality and Magnitude: Event Studies in the Courtroom," Ch. 19, *Litigation Services Handbook, The Role of the Financial Expert*, Third Edition, 2001, p.5. (emphasis added)

[42] Ferrell Report, p. 20.

the market index is easily handled by the model itself which controls for movements in the market. Second, Dr. Ferrell relies on the notion that **volatility** in the S&P 500 index is important, but claims the S&P 500 index is something for which he does not need to control (see Ferrell footnote 28) in calculating an abnormal return. Third, in his justification, Dr. Ferrell is referring to specific events involving companies that he excludes as peers to BoA (Fannie Mae, Freddie Mac, Washington Mutual, and AIG), and which he specifically criticizes me for including in an industry index that is broad enough to include financial service and insurance companies such as AIG. Finally, it is curious why, if this period is so anomalous, Dr. Ferrell would not exclude it altogether rather than combining it with a supposedly more reliable period.

52. A far more direct and relevant method is to ask whether the regression from the Class Period is somehow insufficiently predictive or less reliable than incorporating the post-Class Period data. When I replicate Dr. Ferrell's analysis, but use the Class Period as the estimation window, the resulting model has a higher r-square (.93 versus .81), a lower root mean squared error (2.8% versus 4.7%), a higher t-statistic on the control variable (29.17 versus 24.56) and a more precise estimate of the coefficient on the control variable (standard error of .043 versus .053). **Exhibit 4** provides the details of this regression. Thus, there is absolutely no empirical evidence to support the notion that the Class Period regression is insufficiently suited to predict BoA returns -- in fact, it performs better than the non-standard period added by Dr. Ferrell.

53. Dr. Ferrell's incorporation of the post-Class Period volatility to calculate within Class Period statistical significance creates a substantial and inappropriate bias against finding statistical significance of any event within the Class Period. For example, **Exhibit 5** shows the abnormal price movements calculated by Dr. Ferrell during the Class Period and shows the

difference in the thresholds for statistical significance. Setting aside the earnings announcement on October 7, 2008, which clearly had Company specific news, one would expect 5% of the remaining 87 returns (or between 4 and 5 days) to be significant by chance alone.[43] The chart shows how ***none*** of the other dates prior to the alleged corrective disclosures are statistically significant.

54. The table below, **Table A**, makes this point even clearer. In a well specified event study, one would expect to observe 50% of the days (or more if there was firm specific news) during the relevant period with a t-statistic that is significant at the 50% level, 10% of the days to have a t-statistic that is significant at the 90% level, and 5% of the days to have a t-statistic that is significant at the 95% level. **Table A** shows that if the estimation period of Dr. Ferrell's regression is limited to the Class Period, the results are close to that expectation; however, using his Class Period plus Post-Class Period estimation period shows that there are substantially fewer days in each category during the Class Period than one would expect. The clear implication is that his inclusion of the post-Class Period inappropriately biases the assessment of statistical significance of price movements during the Class Period.

[43] "Returns are often assumed to be distributed normally…" (*See* Ernst R. Berndt, *The Practice of Econometrics: Classic and Contemporary*, Addison-Wesley, 1991, p. 22). About 95% of the area under the normal curve is within two (1.96) standard deviations in each direction of the mean, leaving a total of 5% in the tails. Using a 95% confidence interval is consistent with the statistical tests used in the event study where I consider an abnormal return more than 1.96 standard deviations from the expected return to be statistically significant. To view a standard normal distribution and read about its properties *see* Robert D. Mason, Douglas A. Lind and William G. Marchal, "The Normal Probability Distribution," Ch. 7 in *Statistical Techniques in Business and Economics*, Irwin/McGraw-Hill, Tenth Edition, 1999. Also, from David I. Tabak and Frederick C. Dunbar, "Materiality and Magnitude: Event Studies in the Courtroom," Ch. 19, *Litigation Services Handbook*, *The Role of the Financial Expert*, Third Edition, 2001, p. 9: "…if an event is material at the 5 percent level, this means that there is only a 5 percent likelihood that the abnormal return (or the stock price movement once one controls for market, industry, and other effects) could have been caused by the stock's normal random price fluctuations. Alternatively, we can say that we are 95 percent confident that the abnormal return is greater than what would be expected based on the stock's normal random price fluctuations."

Table A

		Actual percentage over Class Period	
Significance level	Expected Percentage	Ferrell's regression	Ferrell's regression limited to the Class Period
95% level	5%	0.0%	7.5%
90% level	10%	1.3%	8.8%
50% level	50%	21.3%	45.0%

55. **Table B**, below, demonstrates that once Dr. Ferrell's regression is run over the Class Period, Plaintiffs' alleged corrective disclosure dates of January 12, January 13, January 15, January 16, and January 22 are all highly statistically significant at well beyond the 95% confidence level.[44] In fact, according to the corrected Ferrell model, the probability that one would observe this magnitude of price decline by chance is 2.63%, 0.60%, less than 0.01%, 0.37%, and less than 0.01% for each day respectively.

Table B

Date	Coefficient	t-stat	p-value
January 12, 2009	-0.06	2.25	0.0263*
January 13, 2009	-0.08	2.85	0.0060**
January 15, 2009	-0.12	4.18	<.0001**
January 16, 2009	-0.08	2.99	0.0037**
January 22, 2009	-0.12	4.32	<.0001**

* significant at 95%; ** significant at 99%

56. Finally, Dr. Ferrell's use of post-Class Period data is inappropriate because his event study methodology assumes that volatility and the relationship between the variables in the regression are stable during the estimation period. As shown in **Exhibit 2**, attached hereto, that

[44] In addition, the two-day return of January 12 and January 13 is highly significant (well beyond the 99% confidence level).

is simply not the case here because volatility is much different in the Class and post-Class Periods.

57. In addition to the analysis in the previous sections, this correction of the event study in the Ferrell Report further reinforces the unreliability of Dr. Ferrell's opinion that the Q4 2008 losses and bonus payments at Merrill Lynch were immaterial.

58. I declare under penalty of perjury under the laws of the United States of America that the foregoing is true and correct. Executed this September 26, 2011.

Chad Coffman

Exhibit 1
Bank of America Corp. Common Stock Market Model

Time Period:	9/18/2008 to 1/11/2009[1]
Number of Observations:	79
Adjusted R-Square:	0.87
Root Mean Squared Error	3.21%

Variable	Coefficient	t Value
Intercept	0.00	0.06
S&P 500 Total Return	1.02	9.71
S&P 500 Financial Index[2]	1.46	11.18

Source: Bloomberg

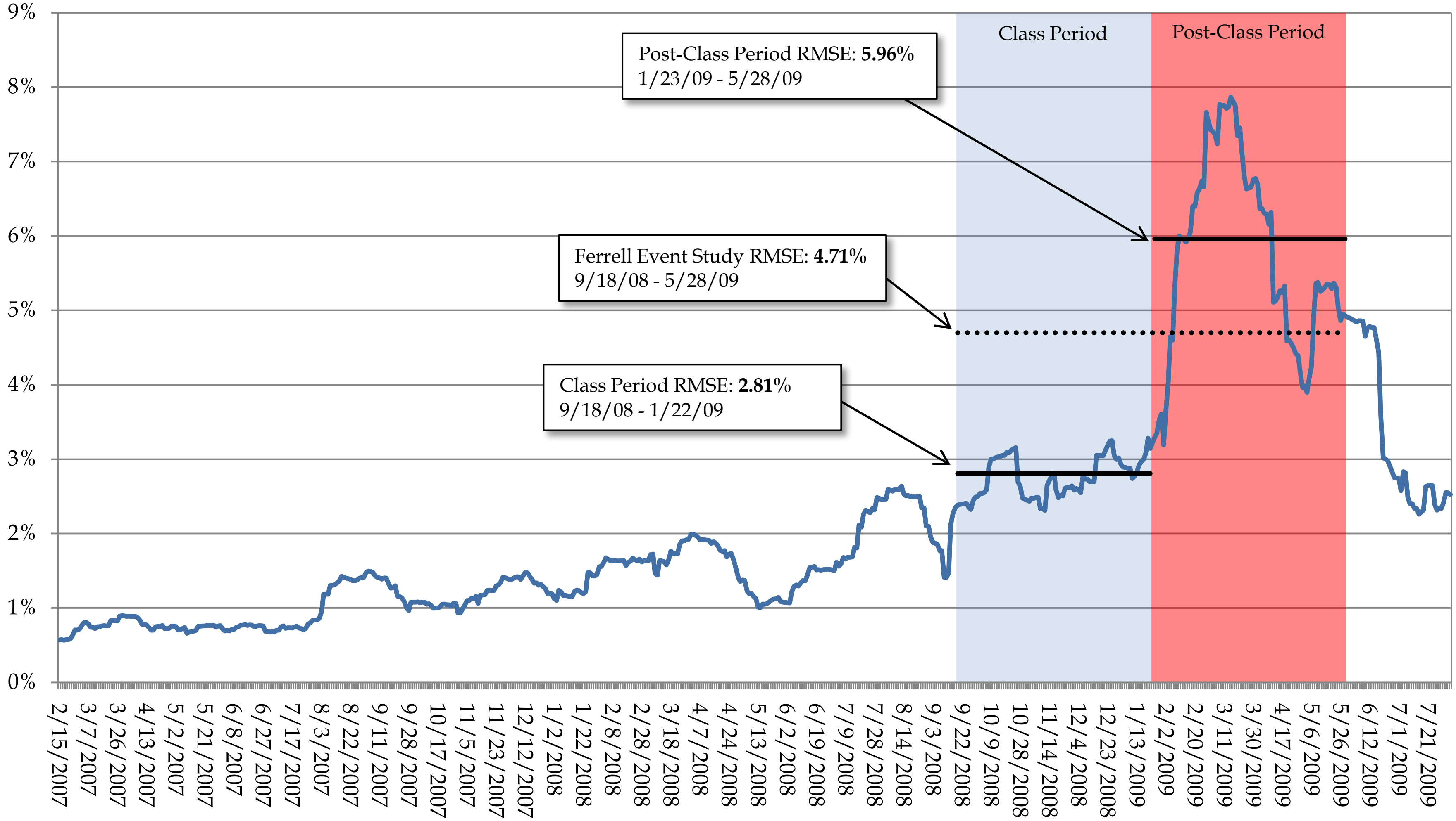
[1] I have removed 10/7/2008 due to the highly significant abnormal return on that day as a result of an earnings announcement.

[2] I have removed Bank of America and Merrill Lynch from the index.

Abnormal Returns on Corrective Disclosures

Date	BAC Return	S&P 500 Return	S&P 500 Financial Return	Abnormal Return	t-stat	p-value
1/12/2009	-12.0%	-2.3%	-2.8%	-5.6%	-1.74	0.0856
1/13/2009	-6.8%	0.2%	1.9%	-9.8%	-3.04	0.0032
1/15/2009	-18.4%	0.1%	-4.1%	-12.6%	-3.93	0.0002
1/16/2009	-13.7%	0.8%	-2.2%	-11.2%	-3.49	0.0008
1/22/2009	-14.5%	-1.5%	-3.9%	-7.4%	-2.29	0.0248

Exhibit 2
Bank of America 30-Day Rolling Root Mean Squared Error from Ferrell Regression Model
2/15/2007 to 8/13/2009



Note: Returns for October 7 2008; January 12, 2009; January 13, 2009; January 15, 2009; January 16, 2009; January 22 2009; and April 20, 2009 have been excluded from the Root Mean Squared Error calculation.

Prepared by Global Economics Group

Exhibit 3
Test of Equality of Variance of Abnormal Returns From Ferrell Event Study Between Class Period and Post-Class Period

	Number of Observations[1]	Standard Deviation
Class Period	80	2.81%
Post-Class Period	86	5.96%

Test of Equality of Variances

F statistic	4.51
p-value	<0.0001

[1]Consistent with the Ferrell Report, observations exclude abnormal returns on September 18, 2008; October 7, 2008; January 12, 2009; January 13, 2009; January 15, 2009; January 16, 2009; January 22, 2009; and April 20, 2009.

Exhibit 4

Comparison of Ferrell Regression Models Using Non-Standard Regression Period versus Class Period Regression Period

	Class Period + Post-Class Period
Time Period:	9/18/2008 to 5/28/2009
Number of Observations:	174
Adjusted R-Square:	0.81
Root Mean Squared Error	4.71%

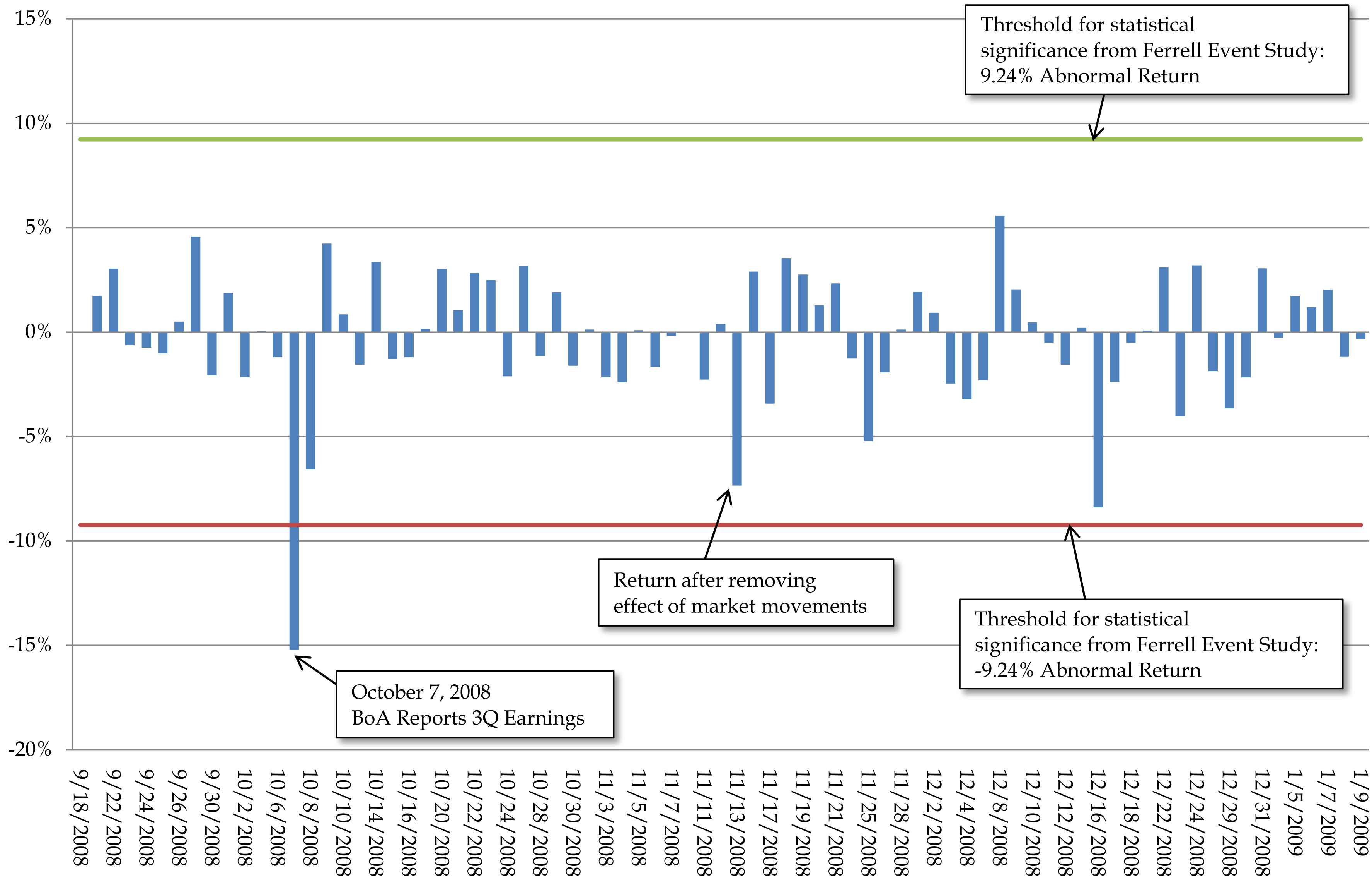
Variable	Coefficient	Standard Error	t Value
Intercept	0.00	0.004	0.06
Ferrell Peer 17 Index	1.31	0.053	24.56
9/18/08 Indicator	-0.06	0.048	-1.32
10/07/08 Indicator	-0.15	0.048	-3.19
1/12/09 Indicator	-0.06	0.047	-1.29
1/13/09 Indicator	-0.08	0.047	-1.71
1/15/09 Indicator	-0.11	0.047	-2.38
1/16/09 Indicator	-0.08	0.047	-1.72
1/22/09 Indicator	-0.12	0.047	-2.49
4/20/09 Indicator	-0.12	0.048	-2.53

	Class Period
Time Period:	9/18/2008 to 1/22/2009
Number of Observations:	87
Adjusted R-Square:	0.93
Root Mean Squared Error	2.78%

Variable	Coefficient	Standard Error	t Value
Intercept	0.00	0.003	-0.32
Ferrell Peer 17 Index	1.25	0.043	29.17
9/18/08 Indicator	-0.05	0.029	-1.84
10/07/08 Indicator	-0.16	0.028	-5.60
1/12/09 Indicator	-0.06	0.028	-2.26
1/13/09 Indicator	-0.08	0.028	-2.83
1/15/09 Indicator	-0.12	0.028	-4.13
1/16/09 Indicator	-0.08	0.028	-2.99
1/22/09 Indicator	-0.12	0.028	-4.24

Source: Bloomberg, Ferrell Report

Exhibit 5
Abnormal Returns from Ferrell Event Study
During Class Period Prior to Alleged Corrective Disclosures



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Appendix A

List of Additional Documents Relied Upon

All Documents Relied Upon in Coffman Report, filed August 29, 2011

Court Documents

- Expert Report of Dr. Allen Ferrell, filed September 16, 2011.

Bates Stamped Documents

- FERRELL00002571 – FERRELL00002572

SEC Filings/Forms

- Merrill Lynch Form 10-K for fiscal year 2008

News

- Certain Bank of America and Merrill Lynch news articles downloaded from Factiva.
- Certain news articles obtained from the Financial Times and Bloomberg.
- TARP "Term Sheet" from "Treasury, Federal Reserve, and the FDIC Provide Assistance to Bank of America," *Federal Reserve Board*, January 16, 2009
- Transcript of *Lou Dobbs Tonight*, aired January 22, 2009

Bank of America Analyst and Credit Ratings Reports

- Numerous analyst and credit rating reports regarding Bank of America and Merrill Lynch issued during the Class Period including credit ratings reports by Fitch and Moody's.

Academic Articles/Texts

- Ernst R. Berndt, *The Practice of Econometrics: Classic and Contemporary*, Addison-Wesley, 1991.
- A. Craig MacKinlay, "Event Studies in Economics and Finance," *Journal of Economic Literature*, Vol. 35, No. 1, March 1997, pp. 13-39.
- Robert D. Mason, Douglas A. Lind and William G. Marchal, "The Normal Probability Distribution," Ch. 7 in *Statistical Techniques in Business and Economics*, Irwin/McGraw-Hill, Tenth Edition, 1999.

APPENDIX B

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EMPLOYMENT:

Global Economics Group, LLC
President (2008 - Current)

Global Economics Group specializes in the application of economics, finance, statistics, and valuation principles to questions that arise in a variety of contexts, including litigation and policy matters throughout the world. With offices in Chicago, Boston, San Francisco and Atlanta, Principals of Global Economics Group have extensive experience in high-profile securities, antitrust, labor, and intellectual property matters.

Market Platform Dynamics, LLC
Chief Financial Officer & Chief Operating Officer (2010 – Current)

Market Platform Dynamics is a management consulting firm that specializes in assisting platform-based companies profit from industry disruption caused by the introduction of new technologies, new business models and/or new competitive threats. MPD's experts include economists, econometricians, product development specialists, strategic marketers and recognized thought leaders who apply cutting-edge research to the practical problems of building and running a profitable business.

Chicago Partners, LLC
Principal (2007 – 2008)
Vice President (2003 – 2007)
Director (2000 – 2003)
Senior Associate (1999 – 2000)
Associate (1997 – 1999)
Research Analyst (1995 – 1997)

EDUCATION:

CFA Chartered Financial Analyst, 2003

M.P.P. University of Chicago, 1997
Masters of Public Policy, with a focus in economics including coursework in Finance, Labor Economics, Econometrics, and Regulation

B.A. Knox College, 1995
Economics, Magna Cum Laude
Graduated with College Honors for Paper entitled "Increasing Efficiency in Water Supply Pricing: Using Galesburg, Illinois as a Case Study"
Dean's List Every Term
Phi Beta Kappa

SELECTED EXPERIENCE:

<u>Experience in Securities and Valuation Cases:</u>

- Expert consultant for Citigroup/Salomon Smith Barney in various matters related to Jack Grubman's analyst coverage of various companies. This included supporting multiple experts at high-profile arbitration where plaintiffs claimed $900 million in damages. Arbitration panel returned a verdict in favor of client (reported in Wall Street Journal).

- Expert damages consultant in dozens of 10b-5 and Section 11 securities litigation, including, but not limited to:
    - WorldCom
    - Enron
    - Tyco
    - Parmalat
    - Sears
    - Atlas Air
    - UnumProvident
    - XL Capital
    - Household Finance/HSBC
    - Dynegy
    - Anicom

- Expert consultant in multiple cases involving market timing and/or late-trading. Developed models to estimate market timing profits.

- Served as neutral expert for mediator (Judge Daniel Weinstein) in multiple 10(b)-5 securities cases as well as futures manipulation case.

- Expert consultant for the American Stock Exchange (AMEX) where I evaluated issues related to multiple listing of options. Performed econometric analysis of various measures of option spread using tens of millions of trades.

- Expert consultant to large hedge fund that owned bonds in WorldCom. Responsible for directing analysis that led to favorable settlement of their claim in the bankruptcy.

- Performed detailed audit of CDO valuation models employed by a banking institution to satisfy regulators – non-litigation matter.

- Played significant role in highly-publicized internal accounting investigations of two Fortune 500 companies. One led to restatement of previously issued financial statements and both involved SEC investigations.

- Testifying expert in the matter of Kuo, Steven Wu v. Xceedium Inc, Supreme Court of New York, County of New York, Index No. 06-100836. Filed report re: the fair value of Mr. Kuo's shares. Case settled at trial.

- Testifying expert in the matter of Pallas, Dennis H. v. BPRS/Chestnut Venture Limited Partnership and Gerald Nudo, Circuit Court of Cook County, Illinois, County Department, Chancery Division. Filed report re: fair value of Pallas shares. Report: July 9, 2008. Deposition August 6, 2008. Court Testimony February 11, 2009.

- Testifying expert in Washington Mutual Securities Litigation, United States District Court, Western District of Washington, at Seattle, No. 2:08-md-1919 MJP, Lead Case No. C08-387 MJP. Filed declaration August 5, 2008 re: plaintiffs' loss causation theory. Filed expert report April 30, 2010. Filed rebuttal expert report August 4, 2010.

- Testifying expert in DVI Securities Litigation, United States District Court, Eastern District of Pennsylvania, 2:03-CV-05336-LDD. Filed expert report October 1, 2008 re: damages. Filed rebuttal expert report December 17, 2008. Deposition January 27, 2009.

- Testifying expert in Syratech Corporation v. Lifetime Brands, Inc. and Syratech Acquisition Corporation, Supreme Court of the State of New York, Index No. 603568/2007. Filed expert report October 31, 2008.

- Expert declaration in Jacksonville Police and Fire Pension Fund, et al. v. AIG, Inc., et al., No. 08-CV-4772-LTS; James Connolly, et al. v. AIG, Inc., et al., No. 08-CV-5072-LTS; Maine Public Employees Retirement System, et al. v. AIG, Inc., et al., No. 08-CV-5464-LTS; and Ontario Teachers' Pension Plan Board, et al. v. AIG, Inc., et al., No. 08-CV-5560-LTS, United States District Court, Southern District of New York. Filed declaration February 18, 2009.

- Expert declaration in Connetics Securities Litigation, Case No. C 07-02940 SI, United States District Court for the Northern District of California, San Francisco Division. Filed declaration March 16, 2009.

- Testifying expert in Boston Scientific Securities Litigation, Master File No. 1:05-cv-11934 (DPW), United States District Court District of Massachusetts. Filed expert report August 6th, 2009. Deposition October 6, 2009.

- Expert declaration in Louisiana Sheriffs' Pension and Relief Fund, et al. v. Merrill Lynch & Co, Inc., et al., Case Number 08-cv-09063, United States District Court, Southern District of New York. Filed declaration October, 2009.

- Testifying expert in Henry J. Wojtunik v. Joseph P. Kealy, John F. Kealy, Jerry A. Kleven, Richard J. Seminoff, John P. Stephen, C. James Jensen, John P. Morbeck, Terry W. Beiriger, and Anthony T. Baumann. Filed expert report on January 25, 2010.

- Testifying expert in REFCO Inc. Securities Litigation, Case No. 05 Civ. 8626 (GEL), United States District Court for the Southern District of New York. Filed expert report February 2, 2010. Filed rebuttal expert report March 12, 2010. Deposition March 26, 2010.

- Expert declaration in New Century Securities Litigation, Case No. 07-cv-00931-DDP, United States District Court Central District of California. Filed declaration March 11, 2010.

- Testifying expert in Louisiana Municipal Police Employees' Retirement System, et. al. v. Tilman J. Fertitta, Steven L. Scheinthal, Kenneth Brimmer, Michael S. Chadwick, Michael Richmond, Joe Max Taylor, Fertitta Holdings, Inc., Fertitta Acquisition Co., Richard Liem, Fertitta Group, Inc. and Fertitta Merger Co, C.A. No. 4339-VCL, Court of Chancery of the State of Delaware. Filed expert report April 23, 2010.

- Testifying expert in Edward E. Graham and William C. Nordlund, individually and d/b/a Silver King Capital Management v. Eton Park Capital Management, L.P., Eton Park Associates, L.P. and Eton Park Fund, L.P. Case No. 1:07-CV-8375-GBD, Circuit Court of Shelby County, Alabama. Filed rebuttal expert report July 8, 2010. Deposition September 1, 2010. Filed supplemental rebuttal expert report August 22, 2011.

- Testifying expert in Moody's Corporation Securities Litigation. Case No. 1:07-CV-8375-GBD), United States District Court for the Southern District of New York. Filed rebuttal expert report August 23, 2010. Deposition October 7, 2010. Filed rebuttal reply report November 5, 2010.

- Testifying expert in Minneapolis Firefighters' Relief Association v. Medtronic, Inc., et al. Civil No. 08-6324 (PAM/AJB), United States District Court, District of Minnesota. Filed expert report January 14, 2011.

- Testifying expert in Schering-Plough Corporation/ENHANCE Securities Litigation Case No.2:08-cv-00397 (DMC) (JAD), United States District Court, District of New Jersey. Filed declaration February 7, 2011. Filed expert report September 15, 2011.

- Testifying expert in Fannie Mae 2008 Securities Litigation, Master File No. 08 Civ. 7831 (PAC), United States District Court for the Southern District of New York. Filed expert report July 18, 2011.

- Testifying expert in Bank of America Corp. Securities, Derivative, and Employee Retirement Income Security Act (ERISA) Litigation, Master File No. 09 MDL 2058 (PKC), United States District Court for the Southern District of New York. Filed expert report August 29, 2011.

Experience in Labor Economics and Discrimination-Related Cases:

- Expert consultant for Cargill in class action race discrimination matter in which class certification was defeated.

- Expert consultant for 3M in class action age discrimination matter.

- Expert consultant for Wal-Mart in class action race discrimination matter.

- Expert consultant for Novartis regarding various labor related issues.

- Expert consultant on various other significant confidential labor economics matters in which there were class action allegations related to race and gender.

- Expert consultant for large insurance company related to litigation and potential regulation resulting from the use of credit scores in the insurance underwriting process.

- Testifying expert in Shirley Cohens v. William Henderson, Postmaster General, United States Postal Service. United States District Court for the District of Columbia. C.A 1:00CV-1834 (TFH) – Filed report re: lost wages and benefits.

- Testifying expert in Richard Akins v. NCR Corporation. Before the American Arbitration Association – Filed report re: lost wages.

Selected Experience in Antitrust, General Damages, and Other Matters:

- Expert consultant in high-profile antitrust matters in the computer and credit card industries.

- Expert consultant for plaintiffs in re: Brand Name Drugs Litigation. Responsible for managing, maintaining and analyzing data totaling over one billion records in one of the largest antitrust cases ever filed in the Federal Courts.

- Served as neutral expert for mediator (Judge Daniel Weinstein) in allocating a settlement in an antitrust matter.

- Expert consultant in Seminole County and Martin County absentee ballot litigation during disputed presidential election of 2000.

- Expert consultant for sub-prime lending institution to determine effect of alternative loan amortization and late fee policies on over 20,000 customers of a sub-prime lending institution. Case settled favorably at trial immediately after the testifying expert presented an analysis I developed showing fundamental flaws in opposing experts calculations.

TEACHING EXPERIENCE:

KNOX COLLEGE, Teaching Assistant - Statistics, (1995)
KNOX COLLEGE, Tutor in Mathematics, (1992 - 1993)

PUBLICATIONS:

Coffman, Chad and Mary Gregson, "Railroad Construction and Land Value." *Journal of Real Estate and Finance*, 16:2, pp. 191-204 (1998).

Coffman, Chad, Tara O'Neil, and Brian Starr, Ed. Richard D. Kahlenberg, "An Empirical Analysis of the Impact of Legacy Preferences on Alumni Giving at Top Universities," *Affirmative Action for the Rich: Legacy Preferences in College Admissions*; pp. 101-121 (2010).

PROFESSIONAL AFFILIATIONS:

Associate Member CFA Society of Chicago
Associate Member CFA Institute
Phi Beta Kappa

AWARDS:

1994 Ford Fellowship Recipient for Summer Research.
1993 Arnold Prize for Best Research Proposal.
1995 Knox College Economics Department Award.

PERSONAL ACTIVITIES:

Pro bono consulting for Cook County State's Attorney's Office.